Glen Canyon Dam Adaptive Management Work Group
Agenda Item Form
August 24-25, 2016

Agenda Item

Technical Work Group (TWG) Report: Triennial Budget Process Development

Purpose of Agenda Item

To provide an update to AMWG members on the development of the Glen Canyon Dam Adaptive Management Program (GCDAMP) Triennial Budget Process guidance document.

Action Requested

Information item only; we will answer questions but no action is requested.

Presenter

Vineetha Kartha, AMWG alternate from Arizona and TWG Chair

Previous Action Taken

- AMWG approved the GCDAMP Biennial Budget Process on May 6, 2010: Attach_02b
- Memo from Anne Castle directing TWG and AMWG to update the 2010 GCDAMP Biennial Budget Process to a triennial budget process, dated May 17, 2014 and is attached: http://www.usbr.gov/uc/rm/amp/amwg/mtgs/14may27/Attach_02b.pdf

Relevant Science

N/A

Summary of Presentation

In May 2014, the Secretary's Designee directed GCMRC and Reclamation to create a three-year budget and work plan for the GCDAMP for FY15-17, and to work with the AMWG and TWG to create a new process for development of future three-year budget and work plans. While the GCDAMP FY15-17 Triennial Budget and Work Plan (TWP) was completed and approved by the Secretary, the three-year budget process guidance is still in development. As a part of approving the three-year budget process, the TWG at its June 15th meeting discussed the budget process. This presentation will outline the budget process and the TWG discussion on the budget process.

Background

In 2004, AMWG approved a two-year rolling budget process that helped to provide structure for budget development (see the attached 2010 budget process for details). However, it was a very complicated process that was never fully implemented, and on May 6, 2010, the AMWG directed TWG to develop a non-rolling two-year budget process and to implement that during the 2010-2011 fiscal years.

The goal was to reduce the effort expended on budget development while improving the effectiveness of the Grand Canyon Monitoring and Research Center (GCMRC), TWG, and AMWG. Under the 2010 guidance, the GCDAMP would develop a two-year budget the first year of the process. Then, in the

second year the GCDAMP would revisit only year two of the budget and make relatively minor corrections to allow for changes in projects or potential important new starts not envisioned during the development of the two-year budget. The benefit was that substantial effort was saved in year two of the budget process allowing for time and effort to be used on other endeavors of interest to the GCDAMP. The major components of the process included:

- Two-year budget spreadsheets, work plans, and hydrographs.
- Modifications of the year two budget based on specific criteria.
- Fiscal reporting, including expenditures for the previous fiscal year (mid-year and end end-of year reports).
- Project progress reports, including an annual reporting meeting in January.
- Utilization of the TWG Budget Ad Hoc Group (BAHG) to interface with the Bureau of Reclamation (Reclamation) and GCMRC in developing a draft biennial work plan and hydrograph, and to help the TWG develop budget recommendations for AMWG consideration.

While moving from a single year budget to a biennial budget was a big step forward, many Department of Interior representatives and GCDAMP stakeholders felt that there remained room for improvement. In an effort to improve the efficiency of the GCDAMP and to target limited resources to the highest priorities, it was decided that the GCDAMP needed a budget and workplan that would be even more flexible and resilient. Inefficiencies in the biennial process were discussed at the February 2014 AMWG meeting, as follows. The budget is adopted on a fiscal year basis, meaning that it starts on October 1. The first year's fieldwork typically begins the following summer, and the second fiscal year of the biennial budget begins before the first field season has ended. The biennial process called for the program to begin development of the next biennial work plan during the early part of the second fiscal year, but at that point, the results of the first year's data collection efforts are only just becoming available and have not been subject to much interpretation. As structured in the biennial process, the development of a two-year work plan and budget was not well informed by the most recent science because of the overlap between the timing of field work, the time it takes to process and analyze data, and the time frames of fiscal years and the budget development process.

As a result, the Secretary's Designee in a May 2014 memo directed GCMRC and Reclamation to create a three-year budget and work plan for the GCDAMP for FY 2015-17, and to work with the AMWG and TWG to update the GCDAMP Biennial Budget Process to a three-year, or triennial, budget and work plan.

Recent Activities

While the GCDAMP FY 2015-17 Triennial Budget and Work Plan was completed and approved by the Secretary, the three-year budget process guidance is still in development. The BAHG will provide a recommendation to the TWG, and the TWG will offer a recommendation to the AMWG on this subject, in the coming year.

At its June 15, 2016 meeting, TWG discussed the budget process and heard the following comments from stakeholders regarding guiding documents, budget timeframe, prioritization, and environmental compliance.

United States Department of the Interior

OFFICE OF THE SECRETARY
Washington, DC 20240

MAY 0 7 2014

MEMORANDUM

To: Jack Schmidt,
Chief, USGS Grand Canyon Monitoring and Research Center
Glen Knowles,
Chief, Adaptive Management Group, Reclamation, Upper Colorado Region

From: Anne J. Castle, Secretary's Designee, Assistant Secretary for Water and Science

Subject: Glen Canyon Dam Adaptive Management Program Triennial Budget and Work Plan

This memo provides the strategic direction for the development of the Glen Canyon Dam Adaptive Management Program (GCDAMP) work plan and associated budget, consistent with the priorities of the Secretary of the Interior on ensuring healthy watersheds and sustainable, secure water supplies and with the directives of the Grand Canyon Protection Act. Since development of the last biennial budget and work plan, we have had many conversations about the Adaptive Management Program. The goal of these conversations has been to improve the effectiveness of the GCDAMP. Moving from a single year budget to a biennial budget was a step forward, but the Interior representatives and many GCDAMP stakeholders believe there remains room for improvement based on what we have learned during the last few years. In an era of shrinking federal budgets, we must target our limited resources to the highest priorities, stay sufficiently nimble to respond to changing needs, and make sure that we are funding those activities that continue to address critical questions. We also need to ensure that the impressive collective knowledge, judgment, and experience of the members of the Adaptive Management Work Group (AMWG) are put to the most valuable use.

The GCDAMP needs a budget and work plan process that is flexible and resilient, that maintains the adaptive management focus of the GCDAMP, and that continues efforts to transition from a concentration on large-scale experimental science to increased focus on applied science to inform management actions. In 2010, we adopted a two-year non-rolling process for review of the Grand Canyon Monitoring and Research Center (GCMRC) and Bureau of Reclamation work plan and budget, partly in order to reduce the amount of time spent by the AMWG stakeholders (as well as GCMRC) on detail-level budget issues. Similarly, as recommended by the Institute for Environmental Conflict Resolution, we have refined the role of the AMWG to better utilize the AMWG's expertise and leadership by focusing discussions on policy consultation and more substantive, less-detailed review of individual elements of the budget and work plan. Most AMWG members and interested parties agree that the GCDAMP has been well served by these efforts to "get out of the weeds" on budget issues. By working with the Secretary to delineate more specifically the issues on which the AMWG's advice is requested and focus the agenda on

those science and policy priorities, the AMWG has become more effective at meeting its charge to advise the Secretary on how best to operate Glen Canyon Dam.

There is still room for improvement. As we discussed at our February 2014 AMWG meeting, there are inefficiencies in the biennial process. The budget is adopted on a fiscal year basis, meaning that it starts on October 1. The first year's field work typically begins the following summer, and the second fiscal year of the biennial budget begins before the first field season has ended. The existing schedule calls for the program to begin development of the next biennial work plan during the early part of the second fiscal year, but, at that point, the results of the first year's data collection effort are only just becoming available and have not been subject to much interpretation. Under Dr. Jack Schmidt's leadership, the budget development process is inclusive and transparent, which has been applauded by AMWG and TWG members, but it still requires considerable time and resources. As currently structured, this detailed process for development of the two-year work plan and budget is not well informed by the most recent science because of the overlap between the timing of field work, the time it takes to process and analyze data, and the time frames of fiscal years and the budget development process.

I believe we can improve on our efforts to make the GCDAMP and AMWG more effective by further refining the time GCMRC, Reclamation, the AMWG, and the Technical Work Group (TWG) spend in the budget development process by creating a work plan with a three-year scientific vision on which the annual budgets are based. Nevertheless, a three-year budget process must also recognize that scientific learning and funding availability may require mid-course adjustments.

Accordingly, I am directing GCMRC and Reclamation to develop a three-year scientific work plan and associated budgets for the GCDAMP for fiscal years 2015-2017 and to work with the AMWG and TWG to prepare a triennial budget development timeline and process that can be used in the future. This proposed timeline and process will reflect the priorities and transitions described above. The timeline will also provide target dates for mid-course review of the work plan and budget.

I recognize that it will be a challenge to develop both a three-year budget and work plan as well as a process for the development of future work plans, and I thank you in advance for the effort required. This concept is consistent with the process and planning document that the AMWG approved on May 6, 2010 (when the biennial process was first adopted), which was explicitly intended "to reduce the effort currently expended on the budget process while maintaining a high-quality adaptive management program." By further focusing this process, we will make even more effective use of AMWG, TWG, and Budget Ad Hoc Group (BAHG) members' time. The draft FY 2015-2017 budget and work plan (DBWP) will be developed by GCMRC and Reclamation based on input received from the TWG and Interior agencies and will be organized around the four Desired Future Conditions: Colorado River Ecosystem, Cultural Resources, Recreation, and Hydropower. Reclamation and GCMRC will also consider the recommendations TWG provided following its April 2014 meeting. The DBWP must also be responsive to the outcomes of the LTEMP EIS and be able to provide monitoring and research support for the experimental framework established by the LTEMP. Thus, work plan

development may necessitate modifications late in the process to address LTEMP monitoring and research needs associated with the expected completion of LTEMP later this year.

In my March 31, 2011, memorandum to GCMRC regarding science planning, I identified three main science priorities: science relevant to compliance with the Endangered Species Act, particularly relative to native fish and humpback chub; science informing our compliance with the Grand Canyon Protection Act, especially the sediment resource; and science on non-native fish control and the recreational trout fishery. Our understanding of these issues and the interactions among them has continued to evolve, and these priority issues will be fully analyzed in the LTEMP EIS. Thus, the need for this science continues.

As I also noted in my memorandum, however, it is expected that our concerns about other resources might increase in response to development of Desired Future Conditions and other recommendations. At the time of my 2011 memorandum, it did not appear that there were significant science questions related to cultural resources, although those resources were identified as a high priority for resource management. Subsequently, there have been advancements in understanding about how cultural and archaeological sites are linked to modern river processes and the role of Traditional Ecological Knowledge (TEK) in contributing to scientific understanding and river operations, and the FY13/14 biennial science plan included a research project to help understand that issue. These issues should also be considered priorities.

While LTEMP will address these issues and others, I think these four issues (the three described in my 2011 memo and the evolving issue related to cultural/archaeological resources as linked to modern river processes) are the primary areas where GCMRC should concentrate its scientific resources. It is also important to reiterate that these priorities do not preclude other issues for scientific investigation where such investigation has widespread support and furthers the purposes of the Adaptive Management Program. Additionally, long-term monitoring of core ecosystem components must continue. The challenge of Work Plan development is to develop a robust scientific program within the relevant budget constraints.

Pending development of the triennial timeline and process described above, I suggest the following procedure for moving forward this year: Reclamation and GCMRC will distribute the DBWP to the Budget Ad Hoc Group (BAHG) and TWG prior to their respective meetings in spring 2014. Reclamation and GCMRC will respond to input from the BAHG and TWG in the materials submitted to the TWG at its June meeting. The TWG will provide a budget recommendation to the AMWG for its August meeting that includes the revised triennial budget and work plan development process created by TWG. The Science Advisors will have an opportunity to review the DBWP and the TWG budget process revisions prior to the June TWG meeting and will present its review of these materials at the meeting. The TWG will consider the revised FY2015-2017 work plan and budget materials at its June meeting. That process will allow for any TWG recommendations to the AMWG on significant unresolved issues to be considered at the August AMWG meeting.

This revised work plan process invests the BAHG and TWG with significant responsibility for working closely with GCMRC and Reclamation to resolve detailed or complex issues. The goal

remains to elevate to the AMWG only science and policy issues related to the work plan and budget and avoid detailed discussion of specific line items at the AMWG level.

I greatly appreciate the work that Reclamation and GCMRC have done to improve the process, as well as the thoughtful comments of many AMWG and TWG members on this subject. We all share the goal of utilizing the time and expertise of the AMWG as efficiently as possible for the benefit of the entire Adaptive Management Program. I believe these changes move us in a positive direction, and will make the program more effective.